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39\$	24E	29	CELESTE	C. GRYN	RERG				
JJJ			V	J. WINTER	D=				

Form approved. Budget Bureau No. 42-B1425

(Other instructions on reverse side)

UNITE	ED S	STATI	ES
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	DEPARTMEN	I OF THE IN	NIERIOR		5. LEASE DESIGNATION AND SERIAL NO.
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Celeste C. Gr	ynberg				Federal 9. WELL NO.
3. ADDRESS OF OPERATOR					3-29 Straw Spring
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21. ELEVATIONS (Show who	ether DF, RT, GR, etc.)				22. APPROX. DATE WORK WILL START*
	.8' GR				Dec. 31, 1982
23.	Г	PROPOSED CASING	G AND CEMENT!	NG PROGRAM	
SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOO	OT SETTING	DEPTH	QUANTITY OF CEMENT
18"	13-3/8"	J- 55 63#		Cem	ent to Surface
12-1/4"	9-5/8"	N-80 43.			0 sx
7 - 7/8"	4-1/2"	J-55 10.	5# 6300 '	500	Above Top of Pay
 Drill 12- Drill 7-7 Run tests Set 4-1/2 	Drill 18" hole 1/4" hole to 19 /8" hole to 630 and logs. " production ca and stimulate)15' and set)0'. : sing if war	9 - 5/8" cas	" surface cas ing.	ing.
			ΔÞ	PROVED BY	THE OTATE

APPROVED BY THE STATE OF UTAH DIVISION OF OIL, GAS, AND MINING DATE: 12-9-52

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen or plug back, give data on present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any.

preventer program, if any. 24. SIGNED Olley Flornelly	Attorney-in-FactCeleste C. Grynberg	Nov. 30, 1982
(This space for Federal or State office use)	APPROVAL DATE	
APPROVED BY	T TI.E	DATE

TEN POINT COMPLIANCE PROGRAM

3-29 Straw Spring Federal

San Juan County, Utah Township 39 South, Range 24 East Section 29 Lease No. U-21269

Celeste C. Grynberg 5000 So. Quebec, Ste. 500 Denver, Colorado 80237

1. Geologic Surface Formation

Dakota

2. Estimated Tops of Geologic Markers

Chinle	- 1865'
Dechelly	- 29601
Hermosa	- 4940'
Upper Ismay	- 5910 '
Lower Ismay	- 6050 '
Gothic Shale	- 6100 '
Desert Creek	- 6140'
Chimney Rock	- 6250 '
TD	- 6300'

3. Estimated Depths of Anticipated Oil, Gas, or Other Minerals

0il: 5500' - 6300'

4. Proposed Casing Program

Hole Size	Casing <u>Size</u>	Interval	Grade	Wt./Ft.	New or Used
18"	13-3/8"	0- 100	J-55	68.0 lb.	New
12-1/4"	9-5/8"	100-1915	N-80	43.5 lb.	New
7-7/8"	4-1/2"	1915-TD	J-55	10.5 lb.	New

5. Pressure Control

Exhibit A is a schematic diagram of the blowout preventor equipment. The BOP's will be hydraulically tested to the full working pressure after nippling up and after any use under pressure. Pipe rams will be operationally checked each 24-hour period, as will blind rams each time pipe is pulled out of the hole.

6. Type and Characteristic of Proposed Circulating Mediums

Adequate stocks of sorptive agents will be on site to handle possible spills of fuel and oil on the surface. Heavier muds will be on location to be added if pressure requires. Circulating mediums will be as follows:

Interval		Туре	Wt. #/Gal.	ViscSec./Qt.	Fluid Loss-CC
0 - 500' - 2 2400' - 1	2400 '	Spud Mud Spud Mud Fresh Water	- - 10# or Less	- - 30 - 36	- 10 CC or Less

7. Auxiliary Equipmnet

The following auxiliary equipment will be used:

Kelly cock, a float at the bit, pit level indicators and flow sensor equipment, sub with full-opening valve on floor, drill pipe connection.

8. Testing, Logging and Coring Program

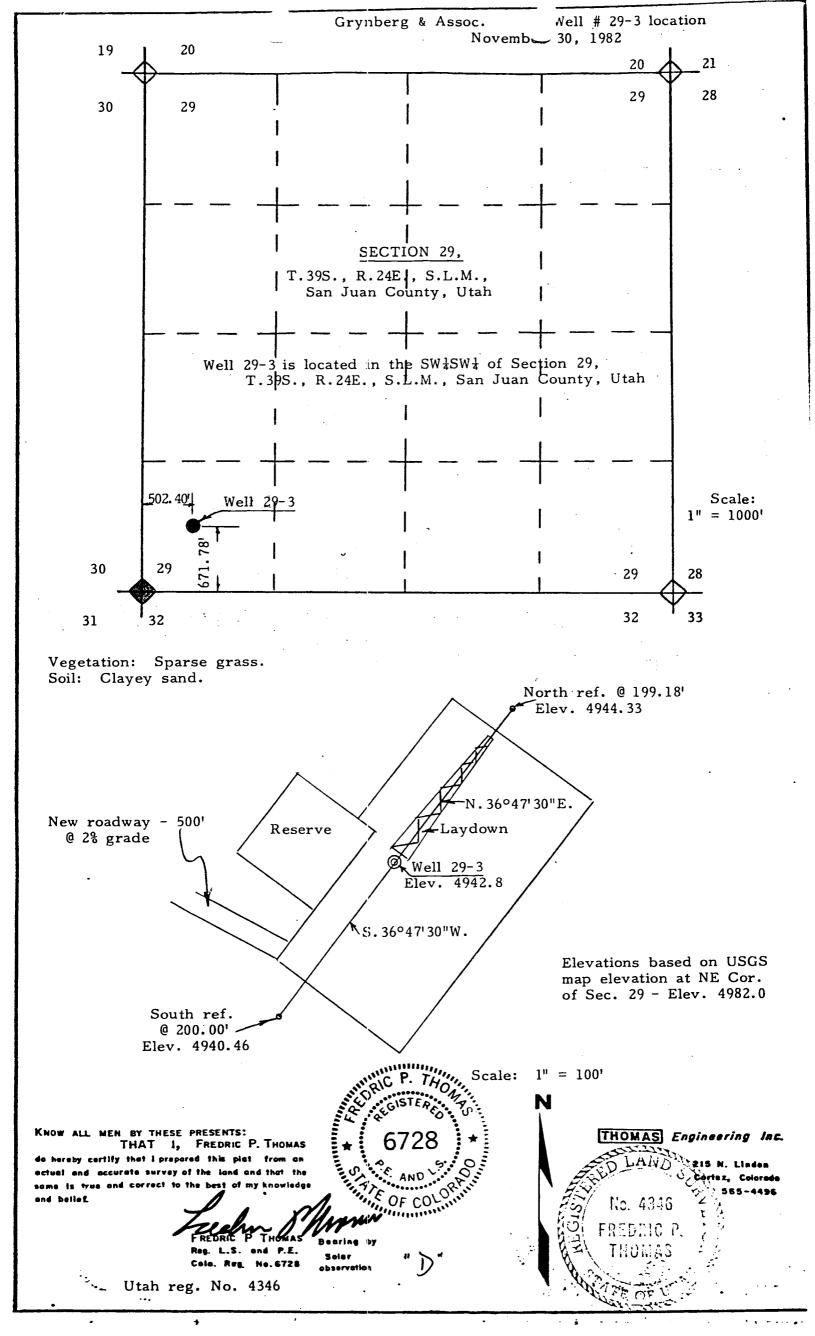
- A. DST's as warranted.
- B. The logging program will consist of a CNL-FDC and Dual Lateral Log-MSFL.
- C. No coring is anticipated.
- D. Stimulation procedures will be determined after evaluation of logs. If treatment is indicated, appropriate Sundry Notice will be submitted.

9. Anticipated Abnormal Pressures or Temperatures

No abnormal pressure or temperatures are anticipated.

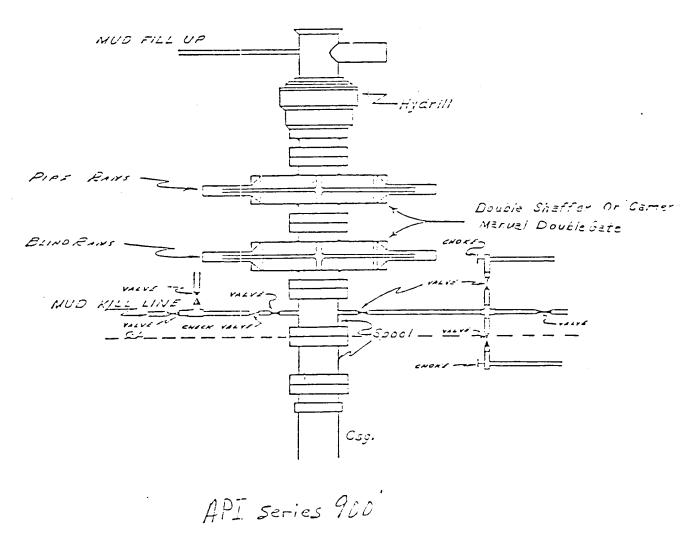
10. Start Date and Duration

The well will be spudded around December 31, 1982 or as soon as permit and surface program are approved by the BIA and MMS. Drilling is expected to take about 25 days, with additional work dependent on results.



EMHIBIT "A"

Blowout Preventer Diagram



NOTE:

Manual controls with closing unit no less than 75° from well head. Remote controls on rig floor.

MULTI-POINT SURFACE USE AND OPERATING PLAN

San Juan County, Utah Township 39 South, Range 24 East Section 29 Lease No. U-21269

Celeste C. Grynberg 5000 So. Quebec, Ste. 500 Denver, Colorado 80237 =3-29 Straw Spring

1. Existing Roads

A. Proposed Well Site

The proposed well site is shown in relation to road and towns in Exhibit A.

B. Route from Reference Points

Access to the site can be achieved via existing dirt road running about 1/8th mile south of the north section line from State Highway 262, approximately 1-1/2 miles to the west. Highway 262 joins U.S. 163 about 13 miles west of the site, which continues north for 15 miles to Blanding and another 25 miles to Monticello.

C. Access Road

The proposed new access road leading from existing dirt road to the well site is shown in Exhibit B_{\star}

D. Roads Within Three-Mile Radius of Exploratory Well

Existing roads within a three-mile radius of the drillsite are shown in Exhibit A. Highway 262 is a medium duty paved road. Unimproved dirt roads run from Highway 262 to within 200' of the site.

E. Plans for Improvement or Maintenance

The existing dirt road from Highway 262 to Section 29 will be widened to 20' total disturbed width and bladed. No improvement is needed on Highway 262 which is commonly used by oilfield traffic.

2. Planned Access Road

A temporary access road will be constructed, as shown in Exhibit B, from the existing seismic trail to the drillsite. The road will be 200 feet long. None of the road will be off lease. Approximately 1000' of new road will connect the seismic trail to the existing dirt road and will also serve wells #1-29 and 2-29. The dirt contractor will be given a copy of the Surface Use Plan and any additional BIA stipulations prior to any work.

(1) Width

The running surface of the planned access road will be 18' wide. New construction will be limited to a total disturbed width of 20'. Surface disturbance and vehicular travel will be limited to the approved location and approved access route. Any additional area needed will be approved in advance.

(2) Maximum Grade

The maximum grade will be about 5%.

(3) Turnouts

Turnouts will be constructed along the existing dirt road at intervals as necessary.

(4) Drainage Design

The new portion of the access route will be bladed, with drainage on both sides.

(5) Culverts

No culverts are needed along the access road.

(6) Surfacing Material

Surfacing material, if needed, will be native soil.

(7) Gates and Fences

No gates, cattleguards, or fence cuts are required.

(8) Flagging

The centerline of the new access road has been staked.

3. Existing Wells

All wells within a two-mile radius of the proposed well are shown in Exhibit A.

- 4. Location of Facilities
 - A. Existing Facilities

- B. New Facilities in Event of Production
 - (1) Proposed Location

Production facilities, if needed, will be located on solid ground of cut area of drill pad, as shown in Exhibit C. Flow lines will be on the well and battery site and will be buried if required.

(2) Area

Facilities will require an area of 300' X 90'.

(3) Construction Methods and Materials

No special materials for the battery site and pad are needed. The surface at the drillsite is suitable for construction.

(4) Protective Measures

The reserve pit will be fenced and flagged to protect wildlife and live-stock. Three sides of the reserve pit will be fenced with four strands of barbed wire before drilling starts. The fourth side will be fenced as soon as drilling is completed. The fence will be kept in good repair while the pit is drying.

C. Plan for Rehabilitation

The reserve pit and that portion of the location and access road no longer needed for operations and maintenance will be restored as nearly as practical to their original condition. Rehabilitation will be done in the manner described under number 10. (below). Enough topsoil will be retained to reclaim the remainder of the location at a future date. The remaining stockpile of topsoil will be seeded in place using the prescribed seed mixture.

5. Water Supply

A. Source

Water will be obtained from a local water hauler who will utilize the San Juan River and/or commercial wells.

B. Method of Transporting

Water will be transported by truck over existing roads.

C. Water Wells

No new water wells will be drilled on the site.

6. Source of Construction Materials

A. Materials

No special materials are needed for the drill pad. In the event materials not available on the site should be needed for the road or pad, they will be obtained from local commercial sources.

B. Soil Stockpiles

The top six inches of soil material will be removed from the location and stockpiled. Topsoil along the access road will be reserved in place.

7. Methods for Handling Waste Disposal

(1) Cuttings

Drill cuttings not retained for evaluation will be placed in reserve pit and covered. Reserve and trash pit locations are shown in Exhibit C.

(2) Drilling Fluids

Drilling fluids will be contained in mud tanks or in the reserve pit,

(3) Produced Fluids

Produced water will temporarily be placed in the reserve pit. Permanent disposal of produced water will be in accordance with NTL - 2B. Any fluids produced during drilling test or while making production test will be collected in test tanks and trucked from the location. Any spills of oil, gas, salt water, or other noxious fluids will be cleaned up and removed.

(4) Sewage

Portable chemical facilities will be provided for human waste (see Exhibit C for location) with contents disposed of per county regulations.

(5) Garbage and Other Waste Material

Garbage, waste, salts, and other chemicals produced during drilling or testing will be handled in trash/burn pit shown in Exhibit C. The trash pit will be constructed near the reserve pit, at least 6' down into solid undisturbed material and with steep sides. The pit will be totally enclosed with fine mesh wire before the rig moves onto location. The pit will be backfilled at the conclusion of operations.

(6) Clean Up of Well Site

After drilling operations are concluded and the rig moved off location, all materials will be cleaned up and no trash material will be left on location. Such material will be burned or disposed of in the trash pit. Nonburnable debris will be compacted and buried under a minimum of 2' of compacted soil. Any dangerous open pit will be fenced until such time as the pit is leveled.

8. Ancillary Facilities

No camps or airstrips will be constructed. A portable trailer will be parked on the drilling location in the area shown in Exhibit C.

9. Well Site Layout

The location of the well site as staked by the surveyor and the orientation of the drill pad are shown in Exhibit D.

(1) Cross Section of Pad

A cross section cut and fill diagram of the drill pad appears in Exhibit E.

- (2) & (3) All necessary facilities to be located on the drill pad are shown in Exhibit E.
- (4) Pit Lining

The reserve pit will be lined with suitable material such as plastic or bentonite.

10. Plans for Restoration of Surface

(1) Contouring and Waste Disposal

The reserve pit will be fenced on the fourth side and allowed to dry completely before backfilling, recontouring, and reseeding. Rat and mouse holes will be backfilled. All trash materials will be segregated with respect to combustibility and then burned or buried. Waste and burn pits will be backfilled. In the event of a dry hole, all disturbed areas will be bladed to blend as nearly as possible with natural topography. Any berms made will be removed and all cuts filled. The disturbed area will be scarified with the contour to a depth of 6" on the new access road, Water bars will be constructed as prescribed.

(2) Revegetation and Rehabilitation

Revegetation and rehabilitation will be done in accordance with BIA stipulations, attached.

(3) Pits

Three sides of the reserve pit will be fenced during drilling operations. Prior to rig removal, the reserve pit will be fenced on the fourth side to prevent livestock or wildlife from becoming entrapped. The fencing will be maintained until leveling and clean-up take place.

(4) 0il

If any oil is on the pits and is not immediately removed after operations cease, the pits containing the oil or other adverse substances will be flagged overhead or covered with wire mesh.

(5) Timetable

Rehabilitation operations will begin immediately after the drilling rig is removed.

11. Other Information

(1) Area Description

The topography of the location is bench on mesa. The soil is shallow and sandy

with some exposed sandstone and chert. Geologic features in the area include bench, cliffs, and a wash area. Vegetation is typical of the area and includes scattered cedar and sparse grass. Fauna include small rodents and birds native to the area.

(2) Surface Use

Surface of the access road and drillsite is owned by the Navajo Tribe and managed by the Bureau of Indian Affairs. A grazing permit has been issued to Joe Beletso, who lives on site.

(3) Proximity of Other Features

Water: The San Juan River, flowing east/west, is about 7-8 miles south of drill-site.

Occupied Dwelling: Joe Beletso and family occupy a dwelling, shown in Exhibit B, south of the quarter section marker and just west of the section line in Section 30.

Cultural/Archaeological Sites: A cultural resource inventory is being conducted on the location and access road. The report will be forwarded to the BIA in Farmington and the Minerals Management Service. If subsurface cultural material is exposed during construction, work in that spot will stop immediately and the BIA archeologist will be contacted. All employees working in the area will be informed by the operator that they will be subject to prosecution for disturbing archaeological sites or picking up artifacts. Salvage or excavation of identified archaeological sites will only be done if damage occurs.

12. Operator's Representative

The field representative responsible for assuring compliance with the approved surface plan is:

Ellen Flannelly Jack Grynberg and Associates 5000 So. Quebec, Ste. 500 Denver, Colorado 80237 (303) 850-7490

13. Certification

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drillsite and access route; that I am familiar with the conditions which presently exist; that the statements made in this plan are to the best of my knowledge, true and correct; and, that the work associated with the operations proposed herein will be performed by Celeste C. Grynberg and her contractors and subcontractors in conformity with the plan and the terms and conditions under which it is approved.

CELESTE C. GRYNBERG

Cleen Flannelly 1

11-30-82 Date

S-face Rehabilitation Stipulations

Cu	ompany Frynberg Vell # 3 Straw Spring	Date: 11-29-52
	Seed mix #6 Crested wheatgrass Slender wheatgrass Smooth brome Orchardgrass Yellow sweetclover	1bs/Acre/PLS 2 1 2 1
	Seed mix # 7 Crested wheatgrass Western wheatgrass Sand dropseed Yellow sweet clover	2 2 1
	Seed mix # 8 Alkali Sacaton Sand dropseed Indian ricegrass Four-wing saltbush	1 1 2 1
Ø	Seed mix # 9 Indian ricegrass Galleta	2.

Needle - n - thread

Four-wing saltbush Cliffrose Well # 2 ____

Compacted areas will be plowed or ripped to a depth of 4 to 6 inches before reseeding. Seed will be drilled to a depth of 1/2 to 3/4 inches or broadcast and followed by a drag or packer. If broad cast, 150% of the recommended seeding rate will be used.

Upon abandonment, the pad will be fenced with a standard five-strand barb wire fence, or equivalent and will have no gates. The fence will be maintained for two years to allow for seeding establishment and will then be removed.

All above ground permanent structures and equipment will be painted a non-glare color that simulates the natural color of the site, as follows:

Brown Fed Stnd. 595a-30318

Green 595a-34127

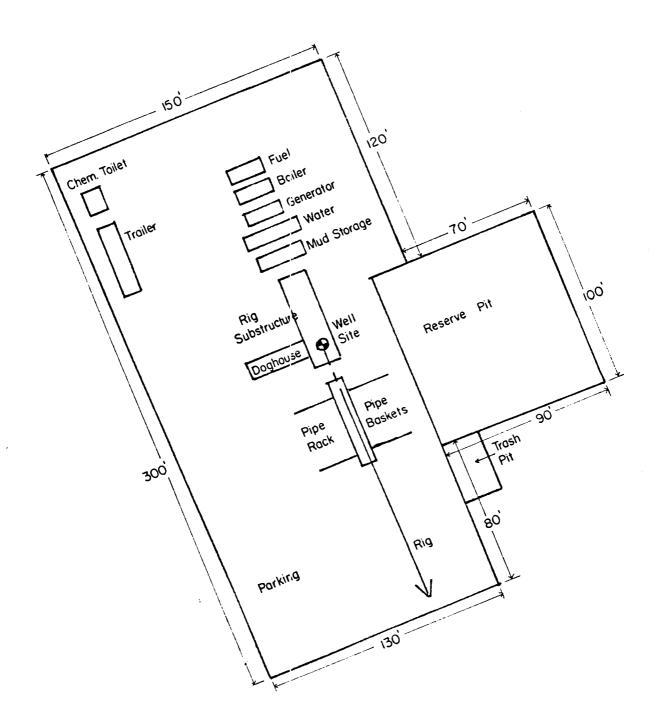
Gray 595a-36357

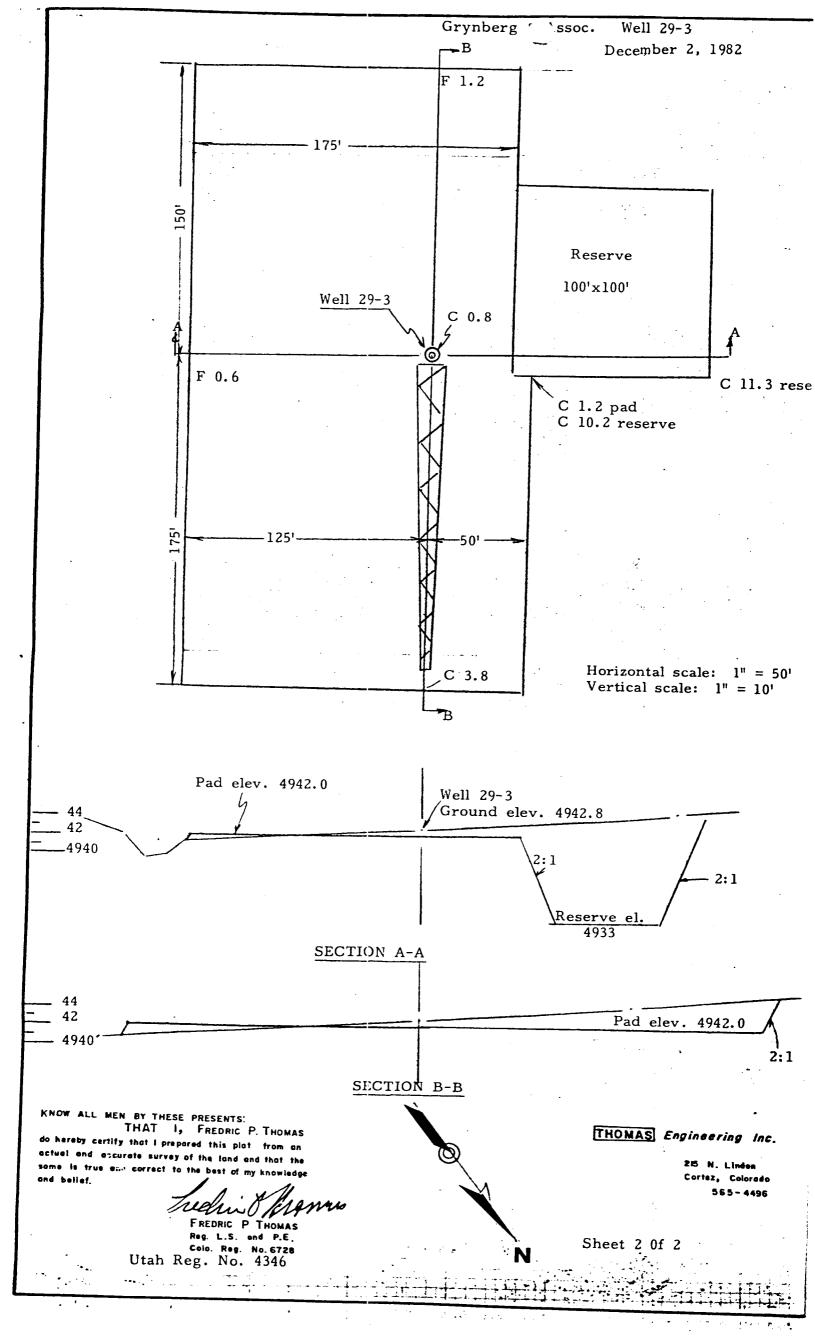
Sand 595a-30277

O other:

EXHIBIT C: Production Facilities

#3-29 Straw Spring
Celeste C. Grynberg





OPERATOR CELESIE C. GRYN	DREAG	DATE 12-9-82
WELL NAME STAND SPAINS 13		
SEC <u>SW SW 29</u> T <u>395</u>		SAN JUAN
43.031 - 30858 API NUMBER	I I	FEL) YPE OF LEASE
POSTING CHECK OFF:		
INDEX	HL	
NID	PI	
MAP		
PROCESSING COMMENTS: NO WELLS	WITHIN 1000	
PJF. /	,	
APPROVAL LETTER:		
SPACING: A-3 UNIT	c-	3-a <u>CAUSE NO. & DATE</u>
c-3-b	c-	3-c
SPECIAL LANGUAGE:		

>

Ť

RECONCILE WELL NAME AND LOCATION ON APD AGAINST SAME DATA ON PLAT MAP.
AUTHENTICATE LEASE AND OPERATOR INFORMATION
VERIFY ADEQUATE AND PROPER BONDING
AUTHENTICATE IF SITE IS IN A NAMED FIELD, ETC.
APPLY SPACING CONSIDERATION
ORDER
UNIT NU
2 c-3-b
c-3-c
OUTSTANDING OR OVERDUE REPORTS FOR OTHER WELLS OF THE OPERATOR.

December 9, 1982

Celeste C. Grynberg 5000 South Quebec, Suite 500 Denver, Colorado 80237

> RE: Well No. Straw Spring Fed. 3-29 SWSW Sec. 29, T.39S, R.24E San Juan County, Utah

Gentlemen:

Insofar as this office is concerned, approval to drill the above referred to oil well is hereby granted in accordance with Rule C-3(b), General Rules and Regulations and Rules of Practice and Procedure.

Should you determine that it will be necessary to plug and abandon this well, you are hereby requested to immediately notify the following:

RONALD J. FIRTH - Engineer

CLEON B. FEIGHT - Director

Office: 533-5771 Home: 571-6068 OR Office: 533-5771

068 Home: 466-4455

Enclosed please find Form OGC-8-X, which is to be completed whether or not water sands (acquifers) are encountered during drilling. Your cooperation in completing this form will be appreciated.

Further, it is requested that this Division be notified within 24 hours after drilling operations commence, and that the drilling contractor and rig number be identified.

The API number assigned to this well is 43-037-30858.

Sincerely,

Norman C. Stout Administrative Assistant

NCS/as cc: MMB e Enclosure

JACK GRYNBERG AND ABSOCIATES

REAL ESTATE DEVELOPMENT DIVISION

TELEX: 45-4497 ENERGY DVR TELECOPIER: 303-623-5224

December 14, 1982

GRYNBERG PETROLEUM COMPANY 5000 South Quebec, Suite 500 Denver, CO 80237 303-850-7490

Mr. Ron Firth
Division of Oil, Gas, and Mining
4241 State Office Building
Salt Lake City, UT 84114

RE: Township 39 South, Range 24 East
Section 29
Straw Spring #1, 2 and 3
San Juan County, Utah

DIVISION OF OIL GAS & FOT HIS

Dear Ron:

Enclosed is a copy of the archaeological survey conducted on November 29, 1982 on the revised access road to #1-29 Straw Spring and the well pads and access roads for #2 and 3-29. This report completes the information submitted as part of our APD's for these wells.

Thanks again for your assistance.

Sincerely,

Ellen Flannelly Senior Landman

EF/ggd encl.

Kellin

Federal Antiquities Permit No. 82-AZ/UT/NM-089 No. 1981-14

An Archaeological Survey of Two Well Pads and Access Roads On McCracken Mesa in San Juan County, Utah

for Jack Grynberg and Associates

locations
Primary Access Road Into Section 29, T39S, R24E
Revised Straw Spring No. 1 Well Pad Access Road
Straw Spring No. 2 Well Pad and Access Road
Straw Spring No. 3 Well Pad and Access Road

by Kurt F. Anschuetz Supervisory Archaeologist

submitted by Margaret A. Powers Principal Investigator

DIVISION OF CONSERVATION ARCHAEOLOGY

Contributions to Anthropology Series No. 612 San Juan County Archaeological Research Center and Library Farmington, New Mexico

December 10, 1982

ABSTRACT

On November 19, 1982, the Division of Conservation Archaeology of the San Juan County Museum Association conducted an archaeological survey of the Straw Spring Nos. 2 and 3 well pads and their access roads for Jack Grynberg and Associates of Denver, Colorado. In addition, the access road for the previously surveyed Straw Spring No. 1 well pad (formerly Superior Oil Company No. 29-1) was moved and the new right-of-way was examined. The survey area is located on the southeast arm of McCracken Mesa in San Juan County, Utah and is under the jurisdiction of the Bureau of Indian Affairs and the Navajo Nation.

No archaeological remains were found directly in the revised access road to Straw Spring No. 1, although the road passes immediately north of Site 42-SA-11670. Two isolated loci were found along its access road.

Five IL's were recorded in the Straw Spring No. 2 well pad. No archaeological remains were found in its access road. IL's were identified along the proposed access road right-ofway connecting the survey area with Utah State Highway 262. No archaeological sites were found within any of the zones of direct It is recommended that archaeological clearance be given to allow Jack Grynberg and Associates to proceed with their proposed drilling operations given the following provision. Because of the extremely high archaeological site density on McCracken Mesa, Jack Grynberg and Associates must insure that the proposed construction and drilling operations be restricted to the archaeologically cleared areas. Particular care must be taken in the construction of the access road into the Straw Spring No. 1 well pad, and the Division of Conservation Archaeology advises that an archaeologist be present to monitor the construction activities adjacent to the 42-SA-11660 site boundaries. Jack Grynberg and Associates should also restrict future traffic to the roads, and not drive over or park on areas outside the well pad or 20 foot access road corridor.

_ INTRODUCTION

On November 29, 1982, the Division of Conservation Archaeology (DCA) of the San Juan County Museum Association conducted an archaeological survey for Jack Grynberg and Associates of Denver, Colorado. Ellen Flannelly of Jack Grynberg and Associates requested the survey on November 24, 1982. Margaret A. Powers administered the project for DCA; Ellen Flannelly administered the project for Jack Grynberg and Associates.

In recognition of the limited, nonrenewable nature of archaeological remains, federal and state governments have enacted legislation that is designed to conserve and protect these resources. The principal federal legislation includes the Antiquities Act of 1906 (PL 52-209), the Historic Preservation Act of 1966 (PL 89-665), the National Environmental Policy Act of 1969 (PL 91-852), the 1971 Executive Order No. 11593, the Archaeological and Historical Conservation Act of 1974 (PL 93-291), and the Archaeological Resources Protection Act of 1979 (PL 96-95).

In addition, the states of Arizona, New Mexico, Utah, and Colorado have enacted laws to ensure compliance with federal legislation and to protect archaeological resources within their jurisdiction. Work undertaken in the course of this project is governed by the stipulations of Federal Antiquities Permit No. 82-AZ/UT/NM-09 and Navajo Nation No. 1981-14 and is for purposes of complaince with these statutes.

Roger Moore and Kurt Anschuetz, DCA archaeologists, surveyed the project area for cultural remains. Dr. Barry H. Holt, Environmental Quality Office, Bureau of Indian Affairs, and Anthony Klesert, Navajo Nation Cultural Management Program, were notified of the survey schedule prior to beginning fieldwork.

The following persons were present during the field inspection: Ellen Flannelly of Jack Grynberg and Associates; Don Englishman of Minerals Management Service; Randy Cornett of Bureau of Indian Affairs; Virginia Norton of Navajo Lands Administration; Fred Thomas and Rod Grove of Thomas Engineering, Inc.; and Dean McClellan of Perry McDonald.

METHODS

The Straw Spring Nos. 2 and 3 well pads were surveyed by the two archaeologists walking parallel transects 10 meters apart. The corners of the area surveyed for each well pad location were designated with wooden lathes marked with indelible ink. The access routes were surveyed by one archaeologist walking a single zig zag transect across the width of the proposed right-of-ways. A buffer zone 25 feet wide was included in the well pad surveys. A 40 foot wide buffer was added to each

side of the access road right-of-ways at the request of Dean McClellan, the contractor from Perry McDonald, in the advent reroutes from the proposed center line become necessary during the construction of new roads or improvements of existing roads. Segments of roads not situated along existing bladed roads or clearly defined two track roads were marked with orange painted lathing.

The archaeologists recorded all cultural remains within the zones of direct impact and the adjoining buffers. Because none of the archaeological resources prossesed sufficient information potential to warrant site status, they were documented as isolated loci (IL). Pertinent environmental data, including landform and vegetation, were also recorded.

In addition to field inspection, the archaeologists conducted a search of the records at the Division of Conservation Archaeology to determine if any sites had been previously recorded in the project area. (The most recent listings of the National Register of Historic Places were consulted to identify any sites that are listed on or nominated for the register.)

Figure 1 is an overall project area map. Figure 2 shows the relationship between the well pads, their access roads, an existing seismic trail and the pertinent archaeological remains.

PROJECT AREA

Primary Access Road into Section 29, T39S, R24E From Utah State Highway 262

Legal Description: T39S, R23E, Section 25, N첫 N첫

T39S, R24E, Section 30, N½ N½ T39S, R24E, Section 29, W¼ NW% S.L.M., San Juan County, Utah

UTM Coordinates: Zone 12, 4137240N, 646825E - Beginning of Road

Zone 12, 4136925N, 649525E - Southwest end of

Boad

Map Source: U.S.G.S. 15' Montezuma Creek, Utah, 1962

Land Jurisdiction: Bureau of Indian Affairs, Navajo Nation

Project Area: 9,875' x 20' (access road)

Surveyed Area: 9,875' x 100' (access road with buffer)

22.7 Acres

Description: The proposed access road into the survey area is an existing bladed dirt road which begins on the west side of Utah State Highway 262, approximately 3.2 miles south of the intersection of the highway and the road leading to Hatch Trading Post. The bladed road heads east for 1.7 miles and descends from the crest of McCracken Mesa to the bottom of an unnamed

north-south tributary canyon of Black Rock Canyon. Much of the first half of the road is cut into aeolian deposits. In low areas, which collect runoff and have a tendency to form standing pools of water, unimproved two track dirt drive arounds are common. At the approximate mid point of this segment, the road crosses a shallow drainage and continues along the south edge of a side canyon as the road drops down into the major tributary canyon. Sandstone outcrops are common along this segment.

In the bottom of the north-south canyon, the east-west road intersects a north-south road. The north and east roads are simple, unimproved two track trails. The bladed road turns south and parallels the west side of a 10 foot deep arroyo for 900 feet, at which point it joins the beginning of the revised access road for the Straw Spring No. 1 well pad. The bladed road continues south to the residence of the local grazing rights leaseholder.

The major plant species identified along the access route include cheat grass (Bromus tectorum), juniper (Juniperus sp.), dropseed grass (Sporobolus aeroides), four-wing saltbush (Atriplex canescens), galleta grass (Hilaria jamesii), Indian rice grass (Oryzopsis hymenoides), prickly pear (Opuntia sp.), rabbitbrush (Chrysothamnus nauseosus), Russian thistle (Salsola kali), sagebrush (Artemisia tridentata), snakeweed (Gutirrezia sarothrae) and narrowleaf yucca (Yucca angustissima). In general, as the road drops from the crest of McCracken Mesa to the canyon bottom, the vegetation changes from a juniper/shrub/grassland plant association to a sparse shrub/grassland in which disturbed habitat plant species, such as cheat grass and snake-weed, predominate.

Cultural Remains: No archaeological sites were found along the primary access road into Section 29, T39S, R24E. Six isolated loci (IL) were encountered but the survey documentation is believed to exhaust the information potential of these remains. The locations and descriptions of the IL's are presented below.

- IL #1 UTM Coordinates: Zone 12, 4137140N, 647200E One clapboard and indented corrugated sherd 40 feet south of the existing road.
- IL #2 UTM Coordinates: Zone 12, 4137160N, 647200E One Brushy Basin chert secondary flake with no evident retouching or utiliztion. The artifact is 30 feet north of the existing road.
- IL #3 UTM Coordinates: Zone 12, 4137180%, 647340E
 Two unidentified whiteware body sherds 40 feet
 north of the existing road.
- IL #4 UTM Coordinates: Zone 12, 4137180%, 647390E One mineral painted, B/W bowl body sherd with wide, solid line decorative motifs and fine, crushed igneous rock temper, one mottled green

chert secondary flake with no evident retouching or utilization, and one silicified wood biface fragment. The artifacts were found on the side of a low dunal knoll, approximately 45 feet north of the existing road.

- IL #5 UTM Coordinates: Zone 12, 4137150N, 648640E
 One rock cairn made of four courses of sandstone
 slabs. The slabs range in size from 3 x 12 x
 16 inches to 4 x 33 x 39 inches, and the cairn
 stands 18 inches high. Seven smaller sandstone
 slabs were found adjacent to the northeast
 side of the cairn; however, their purpose is
 unknown. The cairn is 3 feet south of the
 existing road.
- IL #6 UTM Coordinates: Zone 12, 4137150N, 648740E
 One collapsed cairn consisting of a pile of 12
 unshaped sandstone blocks with a heavy patina.
 The blocks range in size from 4 x 4 x 7 inches
 to 4 x 12 x 16 inches. The IL is on the south
 edge of the existing road cut.

Recommendations: The Division of Conservation Archaeology recommends that Jack Grynberg and Associates be granted archaeological clearance to proceed with the improvement of the primary access road into Section 29, T39S, R24E. The information potential of the six IL's within the surveyed areas has been exhausted and their loss due to the proposed construction activities has been mitigated against. However, given the high archaeological site density on McCracken Mesa, it is strongly advised that the actual construction activities be strictly limited to the corridor surveyed by the archaeologists and that subsequent traffic be restricted to the improved road. That is, Jack Grynberg and Associates should insure that construction and drilling crews do not use areas adjacent to the road for parking or for turning their vehicles.

Revised Straw Spring No. 1 Well Pad Access Road

Legal Description: T39S, R24E, Section 29, NW¹/₂
S.L.M., San Juan County, Utah

UTM Coordinates: Zone 12, 4136925N, 649525E West end Zone 12, 4137050N, 649800E East end

Map Source: U.S.G.S. 15' Montezuma Creek, Utah, 1962

Land Jurisdiction: Bureau of Indian Affairs/Navajo Nation

Project Area: 1,400' x 20' (access road)

Surveyed Area: 1,400' x 100' (access road with buffer)
3.2 Acres

Description: The Straw Spring No. 1 well pad and access read were originally surveyed by the Division of Conservation Archaeology for Superior Oil Jompany. The Straw Spring No. 1 was formerly designated as Superior Oil Well Pad 29-1. The results of the original archaeological survey are reported by Anschuetz (1982). The proposed access road was moved at the request of the local grazing rights lease holder, who expressed concern about the noise which would have resulted by having the access road so close to the family residence.

The revised access road right-of-way begins at the point where the bladed dirt road, which provides access into Section 29, T39S, R24E, approaches a low sandy rise, approximately 900 feet south of the intersection of the bladed road with two unimproved dirt roads. The access road heads east-southeast for 500 to 550 feet along a narrow shelf between a 10 foot deep arroyo and the north boundary of site 42-SA-11670 (see below for the synoptic description of the site). The shelf varies in width from approximately 25 to 60 feet. The road crosses the arroyo at a south bend in the drainage and continues in an east-southeast direction for 300 feet to the nose of a low, north-south ridge made of an outcrop of light green chert The road them turns north along the west edge of a shallow draw to the Straw Spring No. 1 well pad, a distance of 550 feet. Because the access road does not follow an existing two track trail, orange painted lathing was used to mark the center line.

The plants identified along the length of the revised access road include cheat grass (Bromus tectorum), sagebrush (Artemisia tridentata), snakeweed (Gutierrezia sarothrae), fourwing saltbush (Atriplex canescans), Russian thistle (Salsola kali) and dropseed grass (Sporobolus aeroides). The disturbed habitat plant species, such as snakeweed and cheat grass, dominate the ground cover.

Cultural Remains: No archaeological sites or isolated loci were encountered directly within the proposed 20 foot wide road corridor. However, one site, 42-SA-11670, is located within the south buffer zone. The site is given a synoptic description below because of its proximity to the area of proposed direct impact. The site will be given comprehensive description and evaluation in the final report for the intensive reconnaissance survey DCA recently conducted on the northwest, northeast and southeast quarters of Section 29, T39S, R24E for Superior Oil Company (Divsion of Conservation Archaeology, Contributions to Anthropology Series, No. 600).

Site 42-SA-11670 is located on a low sandy rise on the dissected alluvial bench on the west side of the canyon bottom. The canyon drainage borders the site to the north and east. The site consists of a small, intact Pueblo I to Pueblo II habitation roomblock with three distinct and dense midden areas on the crest and upper slopes of the rise. In addition, a possible outlying structure, which is largely destroyed by an old bladed road, was recorded at the northwest end of the site area. The

maximum dimensions of the site, including artifacts which have been washed downslope, are 420 feet northewest-southeast x 295 feet northeast-southwest.

The roomblock is C-shaped and measures 40 feet east-west x 23 feet north-south and may be composed of six rooms. structure opens to the south, and a depression measuring 23 feet in diameter and 13 inches deep is in the plaza area. depression may represent the location of a kiva. areas, which contain hundreds of utility and decorated ceramics, chipped stone lithics, and pieces of fire-cracked sandstone, border the southwest, southeast and east sides of the roomblock. Twenty-two pieces of groundstone, including two-hand manos, slab and trough metates, and miscellaneous shaped slabs, were recorded. Two possible tchamajilla fragments were also observed. major identified ceramic types are Piedra B/W, Cortez B/W, Deadman's B/W, clapboard corrugated, indented corrugated and Mancos B/W. The indented corrugated wares and the Mancos B/W sherds dominate the utility and decorated ceramic assemblages, The chipped stone lithics, are predominately respectively. secondary reduction debris, although primary and tertiary flakes are also common. There is some evidence for the heat treating of raw materials. Chipped stone tools are limited to a small number of retouched flakes, some of which were evidently used as choppers and scrapers.

The possible outlying structural feature consists of six tabular, unshaped sandstone blocks, and approximately 45 to 55 chipped stone lithics and sherds. The feature is exposed in an old road cut and measures 60 feet north-south x 40 feet east-west. Due to the severe disturbance of the manifestation, it is impossible to determine its function or shape.

The site boundaries are clearly marked with blue painted lathing. The boundaries include the scatter of artifacts which has been carried downslope by erosion. These cultural remains have very little intactness unlike the main structural and midden areas on the crest of the rise. Furthermore, artifact densities are very low. No cultural debris was observed eroding out of the arroyo profile below the site.

Site 42-SA-11670 is significant, because it is one of the largest and best preserved habitation loci in the immediate vicinity. There may be up to 6.5 feet of fill in the area of the roomblock and associated depression. Depths of 8 to 20 inches are probably common in the three midden areas. The site is very important in the study of Pueblo I and Pueblo II settlement and land use of McCracken Mesa.

Recommendations: Although it is unfortunate that the revised access road passes so close to site 42-SA-11670, the request of the local grazing lease owner to keep access roads away from his residence and the extremely high site densities in the northeast, southeast, and northwest quarters of Section 29, T39S, R24E, make alternative avenues impossible. The Division of Conservation Archaeology recommends that Jack Grynberg and Associates

Straw Spring No. 3 Well Pad and Access Road

Legal Description: T39S, R24E, Section 39, W\(\) SW\(\) Section 39, 660'FSL, 500'FWL S.L.M., San Juan County, Utah

UTM Coordinates: Zone 12, 4136125N, 649575E (well pad center)

Zone 12, 4136225N, 649560E, (North end of Access

Road)

Zone 12, 4136125N, 649575E (South end of Access

Road)

Map Source: U.S.G.S. 15' Montezuma Creek, Utah, 1962

Land Jurisdiction: Bureau of Indian Affairs/Navajo Nation

Project Area: 350' x 350' (well pad)
150' x 20' (access road)

Surveyed Area: 400' x 400' (well pad with buffer)

150' x 100' (access road with buffer)

4 Acres

Description: The proposed Straw Spring No. 3 well pad is in the bottom of the major north-south tributary canyon in the west quarter of Section 29, T39S, R24E. The main canyon drainage, which is an entrenched arroyo measuring 26 feet wide and 4 feet deep cuts across the east edge of the pad. The soil is composed of sandy alluvium. Some naturally occurring chert angular debris is scattered along the east half of the well pad; these materials are believed to have been introduced into the pad through water action.

The access road begins at Station 228 of the recent seismic line surveyed by Navajo Nation Cultural Resources Management Program archaeologists (see Gilpin and Anderson 1982). The proposed access road follows the existing seismic line trail in a southwest direction until it reaches Station 242, a distance of 1,540 feet. The access road then turns south-southeast for 150 feet, at which point it enters the north-central portion of the well pad location.

The major plant species in the well pad and access road right-of-ways are cheat grass (Bromus tectorum), galleta grass (Hilaria jamesii), prickly pear (Opuntia sp.), snakeweed (Gutierrezia sarothrae), Russian thistle (Salsola kali), sagebrush (Artemisia tridentata), and three-awn grass (Aristida sp.). The ground cover reaches a maximum density of 60% in the alluvial sediments characterizing the canyon bottom.

Cultural Reamins: No archaeological sites were found within the proposed Straw Spring No. 3 well pad or its access road. Five isolated loci (IL) were recorded within the well pad boundaries. The survey documentation of these remains is pelieved to have exhausted their information potential. All of the IL's have the following UTM Coordinates: Zone 12, 4136125N, 649575E. Their descriptions are presented below.

be allowed to develop the revised access road for the Straw Spring No. I well pad provided that the road is clearly restricted to the bench north and east of the site boundaries and that an archaeologist is present to monitor the construction of the road. Equally important, Jack Grynberg and Associates must insure that all traffic be limited to the prepared road and that the employees associated with the road construction and drilling operations do not make unauthorized collections from this or any of the other archaeological sites in the surrounding area.

Straw Spring No. 2 Well Pad and Access Road

Legal Description: T39S, R24E, Section 29, NE% SW% Section 29, 1980'FSL, 1980'FWL S.L.M., San Juan County, Utah

UTM Coordinates: Zone 12, 4136525N, 650025E (Well Pad Center)

Zone 12, 4136875N, 649775E (Beginning of Access

Road)

Zone 12, 4136825N, 649840E (Junction of First

segment of Access Road with Seismic Road)

Zone 12, 4136650N, 649875E (Junction of second segment of Access Road

with Seismic Road

Zone 12, 4136525N, 650025E (End of Access Road at Well Pad)

Map Source: U.S.G.S. 15' Montezuma Creek, Utah 1962

Land Jurisdiction: Bureau of Indian Affairs/Navajo Nation

Project Area: 350' x 350' (well pad)

1,650' x 20' (access road)

Surveyed Area: 400' x 400' (well pad with buffer)

1,050' x 100" (access road with buffer)

Description: The Straw Spring No. 2 well pad is on the north facing slope of a short, wide east-west spur formation which forms the south side of a minor rincon. The well pad extends from the edge of the spur crest down to the bottom of the rincon. The pad area is dissected by numerous channelized washes which flow to the northwest. The major drainage for the rincon borders the north side of the well pad and flows to the west-southwest. An outcrop of poor quality light green chert is exposed in the bottom of the wash. Naturally occurring angular debris from the outcrop is scattered across the northwest corner of the pad.

The proposed access route begins at the southeast edge of the Straw Spring No. 1 access road at the point in which the latter road rounds the nose of a low spur formation and turns north along a shallow drainage. The first segment of the Straw Spring No. 2 access road, which is marked with orange painted lathing, heads 500 meters southeast through a shallow draw to a recent seismic road. The seismic line and its access road were

surveyed by Gilpin and Anderson (1931) for the Navajo Mation Cultural Management Program. No cultural remains were found to preclude the use of the seismic line access road as part of the Straw Spring No. 2 access route. The well pad road follows the seismic trail south for 650 feet as it climbs a slope to the crest of a low, southeast-northwest ridge. The proposed route then turns southeast at Station 228 of the seismic line to follow an existing two track dirt road which leads directly to the west-central portion of the drill pad.

The major plant species identified within the Straw Spring No. 2 well pad and its access aroad are snakeweed (Gutierrezia sarothrae), sagebrush (Artemisia tridentata), four-wing saltbush (Atriplex canescens), Indian rice grass (Oryzopsis hymenoides), cheat grass (Bromus tectorum), blackbrush (Coleogyne ramosissima), juniper (Juniperus sp.) prickly pear (Opuntia sp.), galleta grass (Hilaria jamesii), and shadscale (Atriplex confertifolia). Ground cover in the well pad is moderately dense. The plants along the first segment of the access road are dominated by disturbed habitat species.

Cultural Remains: No archaeological sites were found within the proposed well pad or along its access road. Two isolated loci (IL) were found in the surveyed corridor for the access road segment immediately west of the pad. The survey documentation of these remains is believed to exhaust their information potential. The locations and descriptions of the IL's are presented below:

- IL #7 UTM Coordinates: Zone 12, 4136575N, 649950E
 One white secondary reduction flake without
 evident retouching or utilization in the existing two track dirt road, approximately 13 feet
 from the west edge of the well pad.
- IL #8 UTM Coordinates: Zone 12, 4136625N, 649800E
 Two light grey chert primary reduction flakes
 in the existing two track dirt road, approximately 50 feet from the intersection of the
 road with the recent seismic trail.

Recommendations: The Division of Conservation Archaeology recommends that Jack Grynberg and Associates be granted archaeological clearance to proceed with the construction of the Straw Spring No. 2 well pad and access road. The information potential of the two IL's within the surveyed areas has been exhausted and their loss as a result of the proposed land altering activities has been mitigated against. However, given the great density of archaeological sites in the general vicinity of well pad, it is advised that the construction activities be strictly limited to the well pad boundaries and the 20 foot access road corridor. Furthermore, Jack Grynberg and Associates should insure that construction and drilling crews do not use the areas adjoining the well pad and access road corridor for parking or for turning their vehicles.

- The Poone unfiltrectional core name of Brushy Basin chert. The artifact is in the southeast quadrant of the pad, approximately 30 feet west of the arroyo edge.
- IL #10 Two light green silty chert secondary reduction flakes and one fine-grain white quartz-ite secondary reduction flake in the south-central portion of the well pad, approximately 75 feet south of the well pad center stake.

 None of the artifacts have evident retouching or utilization.
- IL #11 One light grey chert tertiary reduction flake 80 feet south-southeast of the well pad center stake.
- IL #12 One light green chert secondary flake with possible unifacial retouching on one lateral edge. The artifact is 50 feet west-northwest of the well pad center stake.
- IL #13 One B/W mineral painted bowl body sherd with a fine hatchured design and fine sand temper. The sherd was tentatively identified as Mancos B/W. The artifact is in the northwest corner of the well pad.

Recommendations: The Division of Conservation Archaeology recommends that Jack Grynberg and Associates be granted archaeological clearance to proceed with the construction of the Straw Spring No. 3 well pad and access road. The information potential of the five IL's within the well pad boundaries has been exhausted and their loss as a result of the proposed construction and drilling operations has been mitigated against. Given the high archaeological site density in the general vicintiy, it is advised that all land altering activities be clearly restricted to the well pad boundaries and the access road corridors surveyed by the archaeologists. Furthermore, Jack Grynberg and Associates should insure that construction and drilling crews do not use the areas adjacent to the well pad and access road for parking or turning their vehicles.

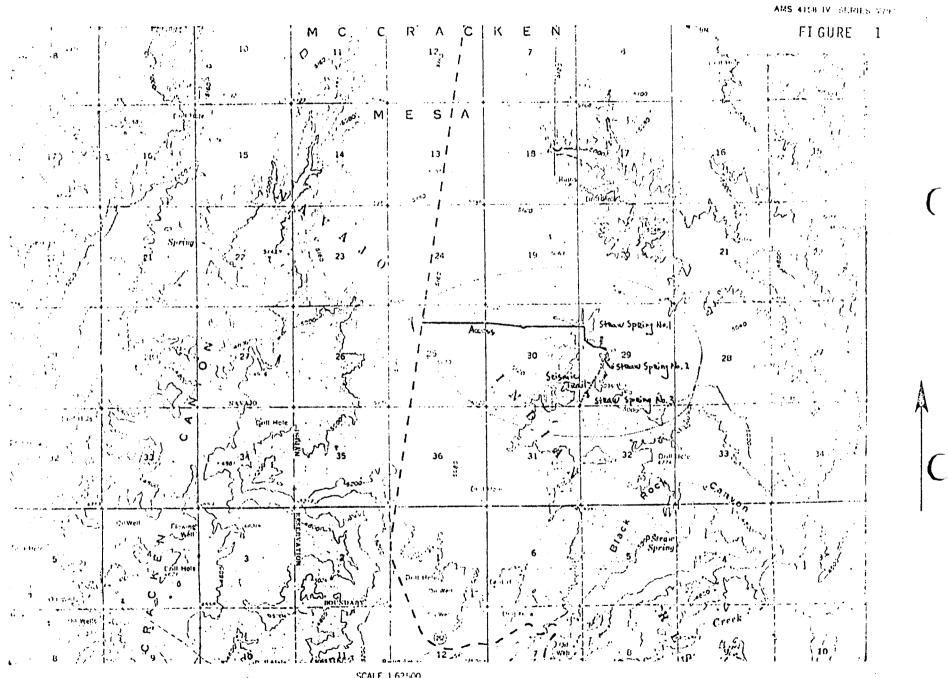
REFERENCES CITED

Anschuetz, Kurt F.

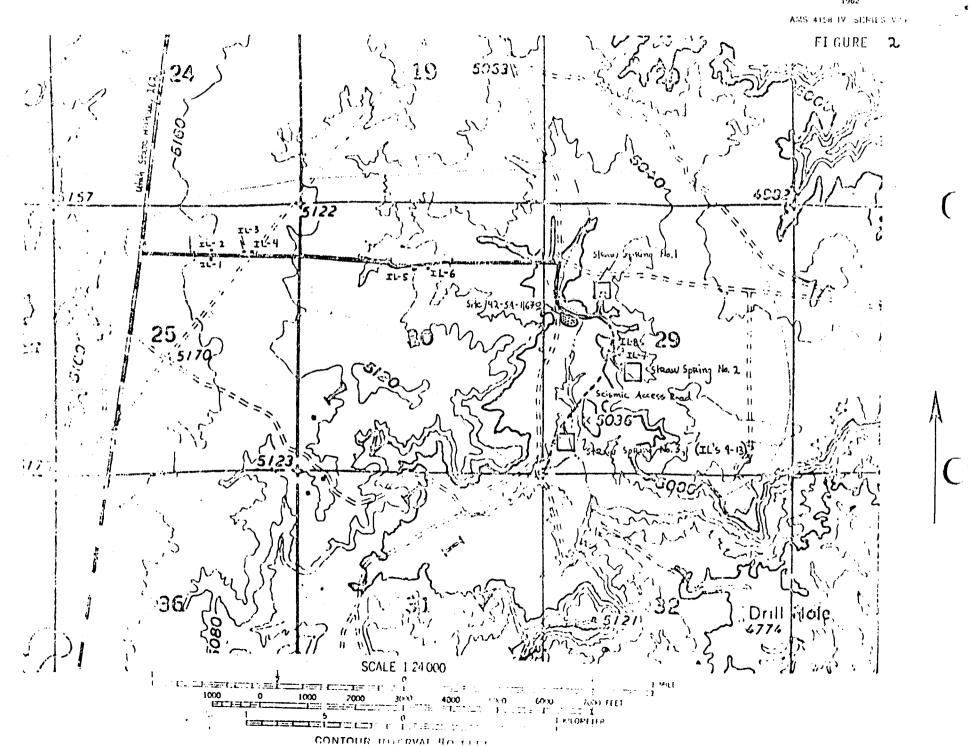
An Archaeological Survey of One Well Pad and Access Road in San Juan County, Utah for Superior Oil. <u>Division of Conservation Archaeology Contributions to Anthropology Series No. 601</u>. San Juan County Archaeological Research Center and Library, Farmington.

Gilpin, Dennis and Joseph K. Anderson

1982 An Archaeological Survey of A Seismic Line for Superior Oil Co., on McCracken Mesa, San Juan County, Utah. Ms. Navajo Mation Cultural Resource Management Program Report No. NNCRMP-82-150. Window Rock.



1962





4241 State Office Building • Salt Lake City, UT 84114 • 801-533-5771

October 20, 1983

Celeste C. Grynberg 5000 South Quebec, Suite # 500 Denver, Colorado 80237

> Re: Well No. Straw Spring Fed. # 2-29 1982' FSL, 1987' FWL NE SW, Sec. 29, T. 39S, R. 24E. San Juan County, Utah

> > Well No. Straw Spring Fed. # 3-29 672' FSL, 502' FWL SW SW, Sec. 29, T. 39S, R. 24E. San Juan County, Utah

Well No. Leopard-Federal # 1-23 1953' FSL', 1985' FWL NE SW, Sec. 23, T. 19S, R. 8E. Emery County, Utah

Gentlemen:

In reference to the above mentioned wells, considerable time has gone by since approval was obtained from this office.

This office has not received any notification of spudding. If you do not intend to drill these wells, please notify this Division. If spudding or any other activity has taken place, please send necessary forms. If you plan to drill these locations at a later date, please notify as such.

We will be happy to acknowledge receipt of your response to this notice if you will include an extra copy of the transmittal letter with a place for our signature, and a self addressed envelope for the return. Such acknowledgement should avoid unnecessary mailing of a second notice from our agency.

Your prompt attention to the above will be greatly appreciated.

Respectfully,

DIVISION OF OIL, GAS AND MINING

Cari Furse

Well Records Specialist

GRYNBERG PETROLEUM COMPANY

5000 SOUTH QUEBEC ● SUITE 500 ● DENVER, COLORADO 80237 USA ● PHONE 303 - 850-7490

TELEX: 45-4497 ENERGY DVR
TELECOPIER: 303 - 753-9997

October 25, 1983

State of Utah Natural Resources Division of Oil, Gas, & Mining 4241 State Office Building Salt Lake City, Utah 84114

RE: Well No. Straw Spring Federal No. 2-29 1982' FSL, 1987' FWL NE4SW4, Section 29, Township 39 South, Range 24 East San Juan County, Utah

Well No. Straw Spring Federal No. 3-29 672' FSL, 502' FWL SW4SW4, Section 29, Township 39 South, Range 24 East San Juan County, Utah

Gentlemen:

This letter is to advise you that Celeste C. Grynberg does not intend to drill the above referenced wells.

Please acknowledge receipt of this letter by signing in the space provided below and returning one copy to us in the enclosed, post-paid envelope.

Sincerely,

GRYNBERG PETROLEUM COMPANY

Susan Stone Senior Landman

SS/mdb Enclosure

Received this 1st day of 104 mblk, 1983.

DIVISION OF OIL, GAS, & MINING

BY: Cari JURSC